

**Notice of Allowability**

Application No.

10/601,538

Examiner

Jeffrey L. Sterrett

Applicant(s)

WADA, MASAHARU

Art Unit

2838

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☐ This communication is responsive to \_\_\_\_.
2. ☒ The allowed claim(s) is/are 1-21.
3. ☐ The drawings filed on \_\_\_\_ are accepted by the Examiner.
4. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some\* c) ☐ None of the:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\* Certified copies not received: \_\_\_\_.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

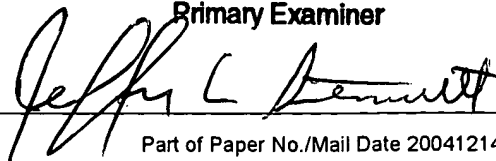
**THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.**

5. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
6. ☒ CORRECTED DRAWINGS ( as "replacement sheets") must be submitted.
- (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review ( PTO-948) attached
- 1) ☐ hereto or 2) ☐ to Paper No./Mail Date \_\_\_\_.
- (b) ☒ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date \_\_\_\_.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
7. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

**Attachment(s)**

1. ☒ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☒ Information Disclosure Statements (PTO-1449 or PTO/SB/08), Paper No./Mail Date 6-24-03
4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
5. ☐ Notice of Informal Patent Application (PTO-152)
6. ☐ Interview Summary (PTO-413), Paper No./Mail Date \_\_\_\_.
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other \_\_\_\_.

Jeffrey Sterrett  
Primary Examiner



## REASONS FOR ALLOWANCE

The claimed invention of a DC-DC converter as recited by claims 1-4 is found to be allowable over the prior art since a DC-DC converter comprising an oscillator synchronized comparator responsive to an output voltage detecting circuit wherein the comparator makes a comparison between a reference voltage and the output voltage of the output voltage detecting circuit each cycle of the oscillator was not found to be singularly or collectively taught by the prior art.

The claimed invention of a DC-DC converter as recited by claims 5-8 is found to be allowable over the prior art since a DC-DC converter comprising a pump circuit and an oscillator synchronized comparator responsive to an output voltage detecting circuit wherein the comparator makes a comparison between a reference voltage and the output voltage of the output voltage detecting circuit each cycle of the oscillator so as to control the pump circuit was not found to be singularly or collectively taught by the prior art.

The claimed invention of a DC-DC converter as recited by claims 9-12 is found to be allowable over the prior art since a DC-DC converter comprising a pump circuit and an pulse generator synchronized comparator responsive to an output voltage detecting circuit wherein the comparator makes a comparison between a reference voltage and the output voltage of the output voltage detecting circuit each cycle of the pulse generator so as to control the pump circuit via a second pulse generator was not found to be singularly or collectively taught by the prior art.

The claimed invention of a DC-DC converter as recited by claims 13-15 is found to be allowable over the prior art since a DC-DC converter comprising a pump circuit and an oscillator synchronized comparator responsive to an output voltage detecting circuit wherein the comparator makes a comparison between a reference voltage and

the output voltage of the output voltage detecting circuit each cycle of a first or a second oscillator so as to control the pump circuit was not found to be singularly or collectively taught by the prior art.

The claimed invention of a DC-DC converter as recited by claims 16-18 is found to be allowable over the prior art since a DC-DC converter comprising a pump circuit and a pulse generator synchronized comparator responsive to an output voltage detecting circuit wherein the comparator makes a comparison between a reference voltage and the output voltage of the output voltage detecting circuit each cycle of a first or a third generator so as to control the pump circuit was not found to be singularly or collectively taught by the prior art.

The claimed invention of a DC-DC converter as recited by claims 19-21 is found to be allowable over the prior art since a DC-DC converter comprising a power switching transistor and an oscillator synchronized comparator responsive to an output voltage detecting circuit wherein the comparator makes a comparison between a reference voltage and the output voltage of the output voltage detecting circuit each cycle of the oscillator so as to control the power switching transistor via a drive circuit was not found to be singularly or collectively taught by the prior art.

Any comments considered necessary by applicant must be submitted no later than the payment of the Issue Fee and, to avoid processing delays, should preferably accompany the Issue Fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeffrey L. Sterrett whose telephone number is (571)

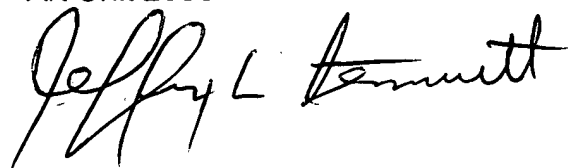
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272-2085. The examiner can normally be reached on Monday-Thursday & 8:00am-5:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Sherry can be reached on (571) 272-2084. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Jeffrey L. Sterrett  
Primary Examiner  
Art Unit 2838

A handwritten signature in black ink, appearing to read "Jeffrey L. Sterrett", written in a cursive style.